ABSTRACT OF THE DISCLOSURE

A reference image signal level curve V1 and a predetermined coefficient are provisionally stored in a ROM of a main controller. The predetermined coefficient provides a threshold level curve by multiplying by the curve V1. A white color image signal level curve V2 is formed upon reading a white reference surface by optical sensors. The white color image signal level curve V2 is compared with the reference image signal curve V1. If at least a part of the curve V2 is not coincident with at least a part of the curve V1, the curve V1 is multiplied by ΔV percent, and this percentage is stored in a RAM. These are performed repeatedly until a part of the curve V2 is coincident with a part of the curve V1 as a result of increase in cumulative ΔV percent. Thus, a correction coefficient K is determined based on the cumulative ΔV percent to provide a corrected image signal level curve. The corrected image signal level curve is compared with the threshold level curve to obtain a binary image data.